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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/550,290	09/22/2005 Akira Shinada		278086US6PCT	9531	
	7590 02/01/201 AK, MCCLELLAND 1	EXAMINER			
1940 DUKE ST	REET	JIANG, YONG HANG			
ALEXANDRIA	A, VA 22314		ART UNIT	PAPER NUMBER	
		2612			
		NOTIFICATION DATE	DELIVERY MODE		
			02/01/2010	ELECTRONIC	

# Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary		Application No.		Applicant(s)					
			10/550,290		SHINADA, AKIRA				
			Examiner		Art Unit				
		,	YONG HANG JIAN	3	2612				
Period fo	- The MAILING DATE of this commun r Reply	nication appea	ars on the cover st	neet with the co	orrespondence ad	idress			
WHIC - Exten after 9 - If NO - Failur Any re	DRTENED STATUTORY PERIOD F HEVER IS LONGER, FROM THE IN sions of time may be available under the provision: SIX (6) MONTHS from the mailing date of this comi period for reply is specified above, the maximum s e to reply within the set or extended period for reply eply received by the Office later than three months d patent term adjustment. See 37 CFR 1.704(b).	MAILING DAT s of 37 CFR 1.136( munication. tatutory period will y will, by statute, ca	TE OF THIS COM  (a). In no event, however  apply and will expire SIX ause the application to be	MUNICATION, may a reply be tim  (6) MONTHS from to the come ABANDONED	I. ely filed the mailing date of this c (35 U.S.C. § 133).				
Status									
1) 又	Responsive to communication(s) file	ed on 30 Octo	ober 2009						
•	•		ction is non-final.						
<b>—</b>		<i>'</i> —		ıl matters. pro	secution as to the	e merits is			
•	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.								
Dispositio	on of Claims								
4)⊠	Claim(s) <u>1-18</u> is/are pending in the	application.							
-	4a) Of the above claim(s) is/are withdrawn from consideration.								
	Claim(s) <u>16 and 17</u> is/are allowed.								
·	6) Claim(s) <u>1-15, 18</u> is/are rejected.								
· ·	Claim(s) is/are objected to.								
	Claim(s) are subject to restri	ction and/or e	election requireme	nt.					
Application	on Papers								
	· Γhe specification is objected to by th	ne Evaminer							
•	The drawing(s) filed on is/are		oted or b\□ object	ted to by the F	- - - - -				
=	Applicant may not request that any obje		· -	=					
	Replacement drawing sheet(s) including			-		FR 1 121(d)			
	The oath or declaration is objected t	_	•			, ,			
	nder 35 U.S.C. § 119	<b>,</b>							
<u> </u>	_	for foreign n	riority under 35 H	S C & 110(a).	-(d) or (f)				
	12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:								
۵,۲	a)								
	Certified copies of the priority documents have been received in Application No  2. Certified copies of the priority documents have been received in Application No								
	3. Copies of the certified copies of the priority documents have been received in this National Stage								
	application from the International Bureau (PCT Rule 17.2(a)).								
* See the attached detailed Office action for a list of the certified copies not received.									
			<b>.</b>						
Attachment	(s)								
	e of References Cited (PTO-892)		4) 🔲 Inte	erview Summary	(PTO-413)				
2) Notice	e of Draftsperson's Patent Drawing Review (		_ Pa <sub>l</sub>	oer No(s)/Mail Da	te				
3) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date  5) Notice of Informal Patent Application 6) Other:									

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#### **DETAILED ACTION**

# Response to Amendment

Applicant's amendment filed 10/30/2009 has been entered. Claims 1, 4, and 6-9 are amended. Claim 18 is newly added. Claims 1-2, 4-10, and 12-18 are pending.

# Response to Arguments

Applicant's arguments, see page 8, filed 10/30/2009, with respect to claim 16 have been fully considered and are persuasive. The previous rejection of claim 16 has been withdrawn.

Applicant's arguments with respect to claims 1, 4, 6, and 9 have been considered but are most in view of the new ground(s) of rejection.

### Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 1. Claims 1-2, 4, 6-7, 9-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Witkowski et al. (US 2002/0197955), and further in view of Sugiura et al. (JP 2001112071 A), McCrery et al. (US 5,046,007), and Bartlett (US 4,714,925).

Regarding claims 1-2, 4, 6-7, and 9-10, Witkowski discloses a system and method comprising a vehicle (14) and an information providing apparatus (via electronic device 12, paragraph 42 and figure 1), the information providing apparatus comprising:

communication means for sending and receiving desired information by means of radio communications (via RF transceiver 10a, paragraphs 42 and 44); and

inherent control means for controlling operations of an information output means for storing information and sending said information to said vehicle as well as operations of the communication means (via electronic device 12 sending information such as personal calendars and e-mail messages to the vehicle once the wireless communications link is established, See paragraph 45);

Witkowski discloses the control means starts up operation of said information output means to transmit said desired information using an automatic wireless data link when the apparatus (electronic device 12) is within the vicinity of the vehicle. (See paragraph 44).

But Witkowski did not disclose the control means monitors a remote control signal from an electronic key corresponding to a key-less entry system for a vehicle via said communication means, and said control means starts up operations of said information output means by using the remote control signal from said electronic key as a trigger to transmit said desired information to said vehicle.

Sugiura teaches a system utilizing a home server to monitors a vehicle remote control signal as a trigger to start automatic operations in a house. In this system, when a user is in his garage (car barn 13), the user uses a keyless transmitter to send a door locking signal to his car; when this vehicle door locking signal is detected by the home server (23), the home server sends out an unlock/lock command to automatically unlock/lock the front door lock (27) and the appliances in the house connected to the

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home server can be configured to automatically turned on/off. (See the Abstract and Paragraphs 105-108)

The apparatus of Witkowski is automatic since it transfers data whenever the vehicle is in the vicinity of the apparatus (Paragraph 44). However, from the teachings of Sugiura, It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the control means in the apparatus of Witkowski to include monitoring a remote control signal from an electronic key relating to a key-less entry system via said communication means, and said control means starts up operations of said information output means using the remote control signal from said electronic key as a trigger to transmit said desired information to said vehicle as taught by Sugiura to provide an operator more flexibility on when to transfer desired information to the vehicle, thereby providing an alternative for users who don't want desired information to be transmitted to the vehicle automatically without supervision.

The combination of Sugiura and Witkowski did not specifically disclose the control means is also configured for controlling, when the remote control signal from said electronic key triggers said information output means to transmit said desired information to said vehicle, operations of an information input means for storing driving information transmitted from said vehicle.

McCrery et al. teach a motor vehicle data collection device on a vehicle to record driving information on the vehicle. The driving information recorded may be the start time and date of a trip. Information recorded may be downloaded to an external device such as a microcomputer. (See the Abstract)

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From the teachings of McCrery, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combination of Sugiura and Witkowski to include a motor vehicle data collection device on a vehicle to record driving information on the vehicle as taught by McCrery, and the control means is also configured for controlling, when the remote control signal from said electronic key triggers said information output means to transmit said desired information to said vehicle, operations of an information input means for storing driving information transmitted from said vehicle in order to download the driving information stored on the vehicle, thereby allowing an operator to review the driving information if desired.

Sugiura teaches monitoring a vehicle remote control signal, but the combination of Sugiura, Witkowski, and McCrery did not specifically disclose the control means is further configured for identifying the vehicle based on vehicle identification information included in the remote control signal, and also to transmit select desired information based on said vehicle identification information detected.

Bartlett teaches a system that stores data transferable to a vehicle, the stored data is transferred to the vehicle only if the vehicle is positively identified by the system. (See the Abstract, and Col. 1, lines 29-35)

From the teachings of Bartlett, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combination of Sugiura, Witkowski, and McCrery to include control means is further configured for identifying the vehicle based on vehicle identification information included in the remote control signal as taught by Bartlett to initiate transfer of data to a vehicle, only if the vehicle is

positively identified, and also to transmit select desired information based on said vehicle identification information detected in order to transfer information based on the vehicle identified, thereby improving the security and accuracy of the system.

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Regarding claims 12-15, the combination of Witkowski, Sugiura, Bartlett, and McCrery discloses the claimed invention wherein McCrery discloses said driving information includes a driving time (via start time and date of a trip, See Abstract).

2. Claims 5 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Witkowski et al. in view of Sugiura et al. and McCrery et al. as applied to claims 4 and 6 above, and further in view of Hara et al. (US 2001/0028297).

Regarding claims 5 and 8, the combination of Sugiura, McCrery, Bartlett and Witkowski discloses the structural elements of the claimed invention but did not specifically disclose said control means sends and receives prespecified information with a sender of said information using information received by said communication means according to said remote control signal as a trigger to execute processing for mutual authentication, and then acquires said desired information based on a result of processing for the mutual authentication.

In data communication, it is obvious to authenticate a particular device before accepting commands from the particular device to avoid false activation from an unauthorized device. Hara et al. teach an example of a control apparatus and control method that teaches authenticating a device before executing a command from the device. (See the Abstract and paragraph 16)

From the teachings of Hara, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combination of Sugiura and Witkowski to include said control means sends and receives prespecified information with a sender of said information based on information received by said communication means according to said remote control signal as a trigger to execute processing for mutual authentication, and then acquires said desired information based on a result of processing for the mutual authentication as taught by Hara to avoid false activation from an unauthorized device, thereby preventing illegal communication.

3. Claim 18 rejected under 35 U.S.C. 103(a) as being unpatentable over Witkowski in view of Sugiura, McCrery, and Bartlett as applied to claim 1above, and further in view of Diaz (2002/0184062).

Regarding claim 18, the combination of Witkowski, Sugiura, McCrery, and Bartlett did not specifically disclose the apparatus further comprising means for determining a next driver to operate the vehicle identified in the vehicle identification information, wherein said desired information is selected based on the next driver.

Diaz teaches a vehicle management system for a facility. The system determines a next driver to operate a vehicle based on the rental requests received, and prepares the vehicle for the next driver. (See the Abstract, Fig. 6, and Paragraphs 49 and 54-56)

From the teachings of Diaz, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combination of Witkowski, Sugiura, McCrery, and Bartlett to include the apparatus further comprising means for

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determining a next driver to operate the vehicle identified in the vehicle identification information, wherein said desired information is selected based on the next driver as taught by Diaz to prepare the vehicle for operation, thereby making the use of the vehicle more convenient.

## Allowable Subject Matter

4. Claims 16-17 are allowed.

### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to YONG HANG JIANG whose telephone number is (571)270-3024. The examiner can normally be reached on M-F 9:30 am to 6:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Brian A. Zimmerman can be reached on 571-272-3059. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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/Y. J./ Examiner, Art Unit 2612

/Brian A Zimmerman/ Supervisory Patent Examiner, Art Unit 2612